Federal Motor Carrier Safety Administration

Fiscal Year 2001 Performance Plan

February 2000

I. INTRODUCTION

The Motor Carrier Safety Improvement Act of 1999 established the Federal Motor Carrier Safety Administration (FMCSA) on January 1, 2000. This FY 2001 performance plan reflects the goals of the new FMCSA and the mandate in the Act for an annual plan. This plan also takes into consideration the safety performance information included in an earlier submission by its predecessor agency, the Office of Motor Carrier and Highway Safety Business Unit in the Federal Highway Administration.

The primary mission of the FMCSA is to improve the safety of commercial vehicle operations on our nation's highways. To accomplish this mission, the FMCSA is focusing its efforts on reducing the number and severity of large truck crashes. Agency resources and activities will contribute to ensuring safety in commercial vehicle operations through training and enforcement, the use of stronger enforcement measures against safety violators, expedited safety regulation and technology innovation, improvements in information systems, and improvements to the commercial driver's license testing, recordkeeping, and sanctions. To accomplish these activities, the FMCSA will work closely in partnership with federal, state, and local enforcement agencies, the motor carrier industry, highway safety organizations, and individual citizens.

II. PROGRAM NEED

Highway crashes kill thousands and injure millions of people every year. In 1998, 5,374 died and 127,000 people were injured in crashes involving large trucks. Large trucks are over-represented in fatal crashes. Of all people killed in motor vehicle crashes, 13 percent died in crashes involving a large truck. Yet trucks represent only 3 percent of registered vehicles and about 7 percent of the vehicle miles of travel.

While these numbers are unacceptably high, the fatal crash rate is the lowest it has been in decades. Fatality rates for large truck crashes dropped 33 percent, and injury rates decreased 30 percent, from 1988 to 1998. These rates declined even as the population of motor carriers has doubled over the last decade. To focus more attention on commercial vehicle safety, Secretary Slater established a Departmental goal in 1999 to reduce large truck-related fatalities by 50 percent by the end of 2009. The FMCSA is the lead agency with responsibility for achieving this goal. The Department has also established a goal to reduce the number of injured persons in crashes involving large trucks by 20 percent by the end of 2008.

III. PERFORMANCE GOALS AND INDICATORS

As prescribed in the Motor Carrier Safety Improvement Act of 1999, the performance goals and indicators of the FMCSA are:

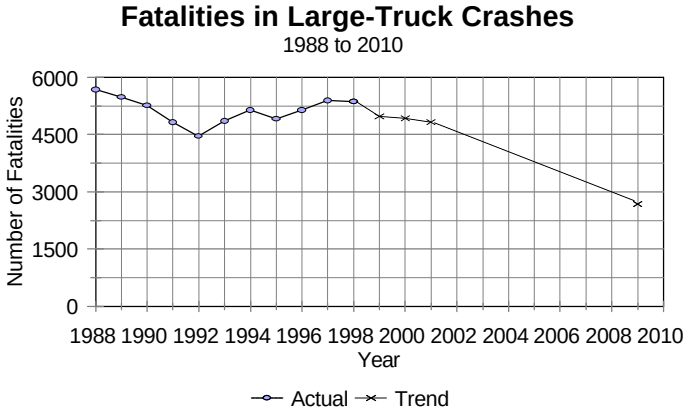
Outcome Goals:

- Reduce the number and rate of crashes, injuries, and fatalities involving commercial motor vehicles.
- Improve the consistency and effectiveness of commercial motor vehicle, operator, and carrier enforcement and compliance programs.
- Identify and target enforcement efforts at high-risk commercial motor vehicles, operators, and carriers.
- Improve research efforts to enhance and promote commercial motor vehicle, operator, and carrier safety and performance.

Performance Indicators: Two performance indicators are used to measure progress towards these goals. More detailed information concerning the development of this performance information is provided in Appendix I.

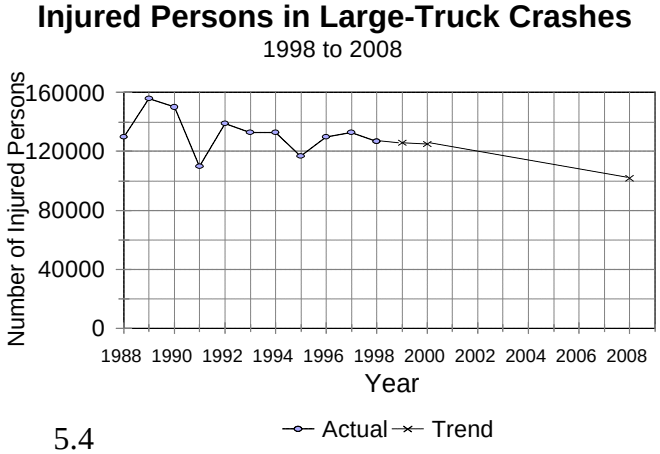
1. Reduce the number of fatalities in crashes involving large trucks 50 percent by the end of 2009, using a 1998 baseline of 5,374.

1998 baseline	5,374
1999 target	4,988
2000 target	4,934
2001 target	4,830
2009 target	2,687



2. Reduce the number of persons injured in crashes involving large trucks 20 percent by the end of 2008, using a 1998 baseline of 127,000.

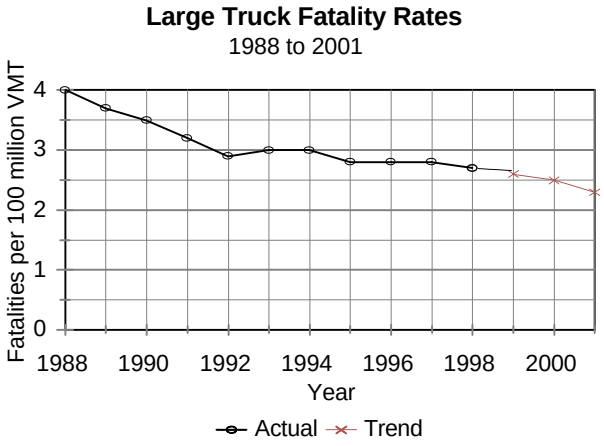
1998 baseline	127,000
1999 target	126,000
2000 target	125,000
2001 target	122,000
2008 target	102,000



While there are no numerical goals established for the rates of fatalities and injured persons involved in traffic crashes, the following performance indicators are also used by the FMCSA to monitor progress toward the safety goals.

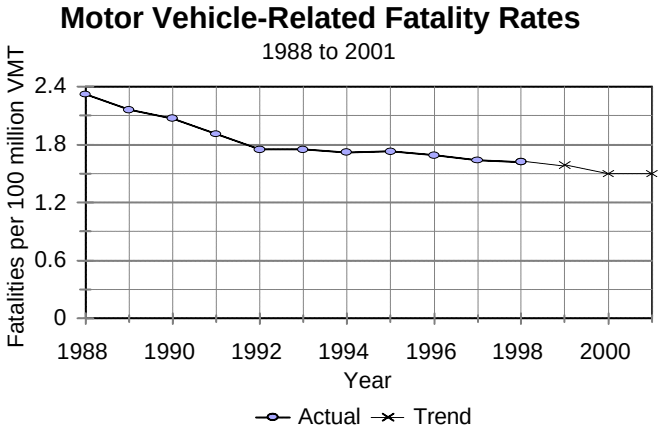
3. Reduce the rate of large truck-related fatalities per 100 million commercial vehicle-miles-traveled (VMT).

1998 actual	2.7
1999 target	2.6
2000 target	2.5
2001 target	2.3



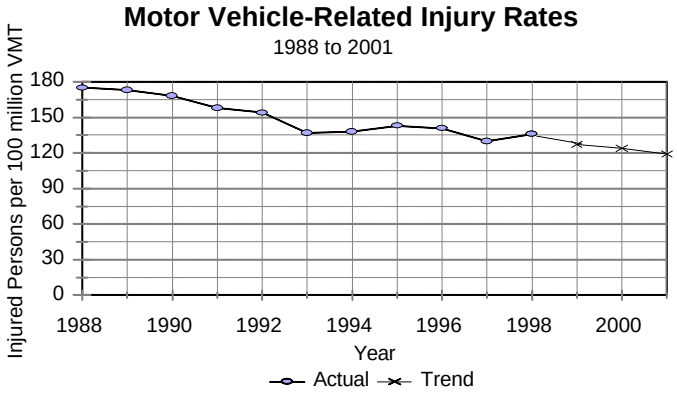
4. Reduce the rate of motor vehicle-related fatalities per 100 million commercial vehicle-miles-traveled (VMT).

1998 actual	1.62
1999 target	1.59
2000 target	1.50
2001 target	1.50



5. Reduce the rate of motor vehicle-related injuries per 100 million commercial vehicle-miles-traveled (VMT).

1998 actual	136
1999 target	127
2000 target	124
2001 target	119



IV. SPECIAL CHALLENGES

Fatalities in large truck-related crashes decreased slightly between 1988 and 1998 from 5,679 to 5,374, respectively. While there was a disturbing reversal in this trend during the mid-1990s, the fatal truck crash rate leveled off at about 2.8 fatal truck crashes per 100 million commercial motor vehicle miles traveled by 1998. To ensure continued progress toward the safety goals, the following challenges must be addressed.

Travel Demand and Fatal Crash Trends

The trend in large truck fatalities reflects unprecedented new business activity with a continuous growth in truck travel demand. The potential exposure of a large truck to a crash, expressed in terms of million vehicle miles traveled, increased 40 percent during this period. There was a dramatic increase in the number of motor carriers and vehicle ownership during this period. The number of interstate motor carriers has increased more than 50 percent since 1990 to close to 500,000 today. The number of Commercial Drivers' License (CDL) holders has increased 38 percent to over 9 million since 1993. These strong upward trends in commercial travel and business growth will likely continue in the near future.

Data on Crash Causation and Motor Carrier Industry Attributes

Driver error is generally cited as a principal factor in crashes with inattention and drowsiness, sometimes brought on by fatigue, being a major contributor. Mechanical defects are cited less often as factors in large truck-related crashes. Factors related to highway design and the environment also contribute to crashes. Motor vehicle crash information which can be used to assess crash causation is not always provided by the states either in the level of necessary detail or on a timely basis. The motor carrier census, an inventory of interstate motor carriers and their individual attributes, is not updated on a regular basis. These data deficiencies limit the design and implementation of effective crash prevention strategies.

Compliance and Enforcement

FMCSA is able to conduct compliance reviews in only a small portion of the motor carrier population because of limited resources and staff. In addition, additional border staff and inspection facilities are needed to ensure safety regulations are met for foreign carriers, particularly when the U.S.- Mexican border is opened beyond the commercial zones.

Commercial Vehicle Driver Training, Licensing, and Reporting

While the introduction of the Commercial Driver's License program during the past decade was a major safety milestone, the program can be strengthened. Driver reporting systems used to monitor driver convictions can be improved to be more complete, timely, and accurate. Commercial driver training programs also need further development through evaluation and

rulemaking.

New Motor Carriers

The number of new motor carriers is increasing rapidly. Because many of these new entrants may have less industry experience and fewer resources than established carriers, the agency will undertake efforts to ensure that new entrants are in compliance with federal safety requirements.

Safety Rulemaking

The agency rulemaking process must adhere to statutory and administrative requirements which make the process cumbersome, particularly if the rule is controversial or complex. In recent years, many statutory deadlines for new safety rulemakings were missed. Limited staff and the requirements for internal review contribute to a lengthy rulemaking process.

V. STRATEGIES

In FY 2001, the FMCSA will meet these challenges and achieve reductions in fatalities and injuries by:

- increasing enforcement and using better targeting of high-risk carriers and commercial motor vehicle drivers;
- improving the timeliness of the issuance of vehicle equipment and operating standards;
- improving safety information and commercial motor vehicle technologies; and
- increasing the safety awareness of the driving public and motor carrier industry.

In particular, the agency will continue to move aggressively to significantly increase its targeted enforcement program. Targets for increased compliance reviews have been established for each safety investigator and guidance issued to limit the use of negotiated fines. The agency will also strengthen its enforcement efforts at the border by significantly increasing inspection staff in preparation for full implementation of the North American Free Trade Agreement. With respect to data deficiencies, the agency is addressing this issue through regulation and an effort to update existing census information. In addition, FMCSA is working to improve the performance of its vehicle inspection and crash data systems for the collection of commercial motor vehicle crash data. These strategic initiatives, as well as other activities underway in the existing programs of FMCSA, are the basis for the FY2001 budget request.

VI. ACTIVITIES AND ASSOCIATED RESOURCES

Program activities are funded through the National Motor Carrier Safety Program ($187 Million) and the General Operating Expenses ($92 Million). In the following paragraphs, five key

activities within the Motor Carrier Safety Assistance Program and six activities in the Information Systems and Strategic Safety Initiatives are described. Two key activities funded within the General Operating Expenses are also discussed. The key activities that will directly contribute to the safety goal of reducing crashes, fatalities, and injuries in large truck crashes are identified in Table A below. When combined, these activities account for approximately three-fourths of the total budget request.

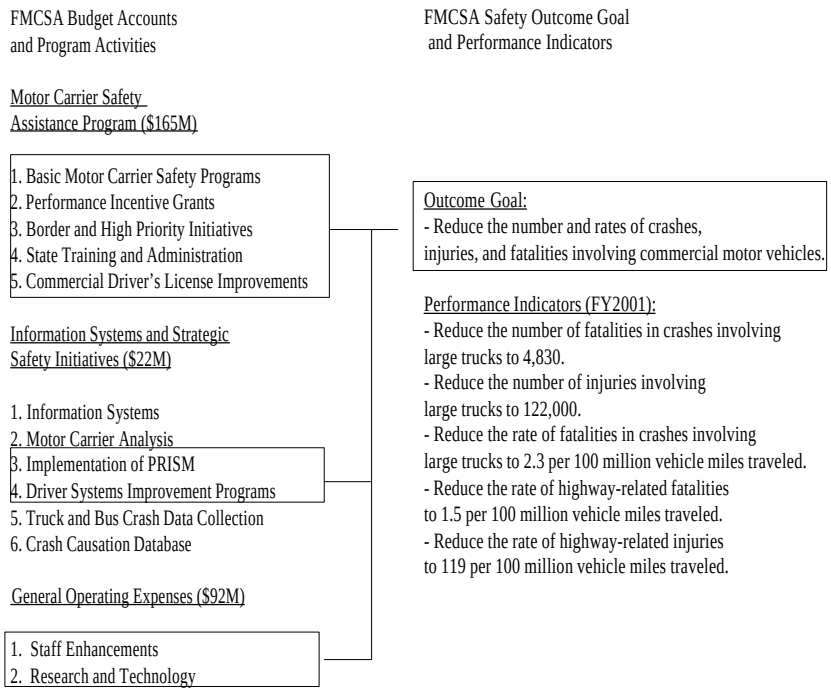


Table A. Key Program Activities Supporting the FMCSA Safety Outcome Goal.
(Note: Key programs are identified within each box. Figures are in million dollars)

National Motor Carrier Safety Program (NMCSP)

The NMCSP supports a broad range of comprehensive commercial vehicle safety programs in each state and provides for improved information systems and analysis. Programs will integrate Federal and state activities through a performance-based approach to commercial vehicle safety nationwide, improve driver and vehicle inspections, traffic enforcement, safety performance data collection, analysis and reporting. The NMCSP will also continue to support State-conducted compliance reviews, hazardous materials training and enforcement including border programs, drug interdiction efforts, public education, and a data collection and reporting system.

Motor Carrier Safety Assistance Programs ($175,000,000)

Basic Motor Carrier Safety Programs - Funds will be allocated to the States to continue uniform driver and vehicle inspections, improve traffic enforcement, safety performance data collection, hazardous materials training and enforcement, data collection and entry, public awareness, and CDL enforcement. Each state will develop strategies and activities which will address its specific commercial vehicle safety problems. ($130,684,375)

Safety Performance Incentive Grants - The FMCSA is providing incentive funds to states that achieve improved fatal crash performance and to those that collect and report timely, accurate and complete crash and inspection data. These funds are intended for use by the states to implement new initiatives beyond their basic programs such as technology deployment, data systems development, data analysis, research and development, accident investigation initiatives and judicial outreach and education. ($6,878,125)

Border and High Priority Initiatives - Funds will be used for efforts in border states to develop safety enforcement training and programs necessary to monitor and enforce safe operations by foreign carriers operating in the U.S. These funds will support on-going operations and the training and deployment of inspection personnel and equipment to identify unsafe equipment and drivers. Funds will also be allocated for important national safety initiatives such as judicial outreach, drug interdiction, public outreach, quality initiatives and peer exchanges of best practices. ($15,500,000)

State Training and Administration - FMCSA will fund training for over 3,000 State enforcement officers. A significant demand exists for training in new inspection techniques involved with advanced technologies, in data collection and communications technologies, to ensure uniform inspections, and provide technical support for technology transfer to the States. ($1,937,500)

Information Systems (Truck and Bus Crash Data Collection) - Funds will be used to improve the collection and analysis of safety data on commercial vehicle and drivers. Information systems improvements will include working in a partnership with the States and the National Highway Traffic Safety Administration to insure the completeness, timeliness, and accuracy of safety data. ($5,000,000)

Crash Causation Study - Funds will be used to design a crash causation database. The FMCSA now either collects, or has access to data on carriers, drivers, vehicles, crashes, injuries and fatalities. A fundamental element which underlies all of this data is determining the causes of large truck crashes. This initiative will establish a database on crash causation, allow for integration with other safety databases, and provide operational funding. ($5,000,000)

Commercial Driver's License Improvements - A pilot program will be established with participating states to enhance their driver record information systems in order to speed the entry of convictions on to driving records, improve the exchange of information between states, and ensure that driver records are complete and contain all driving convictions. These improvements will allow judges and driver licensing agencies to better identify potential problem drivers for remedial action, including removal of their driving privileges. In addition, prospective employers will have access to the full driver conviction record of employees and driver applicants, thus allowing more informed hiring decisions and improving overall commercial driver safety. ($10,000,000)

Information Systems and Strategic Safety Initiatives ($12,000,000)

Information Systems - Through enhanced data identification and collection, FMCSA will implement a new capability to update the SAFESTAT rating process and facilitate accurate roadside electronic screening by providing a very large volume of important, additional carrier safety performance data. FMCSA will streamline registration for the motor carrier industry by providing for a single, unified Federal register of motor carriers, including the USDOT number, the ex-ICC licensing process and the RSPA hazardous materials registration requirement. This process will be further simplified by creating a single electronic registration process for all state and Federal requirements. FMCSA will expand the carrier database to facilitate the uniform safety enforcement of both interstate and intrastate carriers, and provide for the uniform numbering of intrastate carriers and availability of safety data regarding intrastate carriers at the roadside for electronic screening under ITS/CVO. ($3,700,000)

Motor Carrier Analysis - The scope of motor carrier safety data analysis will be broadened to tackle difficult questions such as truck and bus crash exposure and crash causation. Exposure data are key to measuring relative crash rates and focusing programs on the worst safety problems. Unfortunately, the only exposure data available are very broad vehicle miles of travel information. FMCSA will improve its ability to employ available data for quality analysis projects such as profiling the commercial motor vehicle population. As an example, to identify the industry and describe the best practices employed by the different industry segments, no new data needs to be generated. To fully integrate analysis into policy, data and analysis must become accessible to field and headquarters personnel. Analysis must also be used to monitor program effectiveness. These funds will be used to develop and analyze models that measure effectiveness of major programs in reducing crashes. ($2,300,000)

Performance Registration Information and Systems Management (PRISM) Program - Funds will

be used as grants to recruit new states into the program and to assist States that are already participating. States will use the funds for data processing and programming services, equipment purchases, and personnel and training costs associated with full deployment of the program. The funds will also support continued development, implementation, database programming and maintenance, staff support, training, and improvements to FMCSA information systems to support the program. ($5,000,000)

Driver Systems Improvement Programs - Funds will assist states in receiving conviction records from courts, as well as accurate and timely recordkeeping of those convictions on the driver record. It will also support states to provide timely and complete transfer of that information to other states. This funding will enable States to fine tune and improve the operations of the Commercial Driver's License Information System. It will also support education for judges, prosecutors and law enforcement officials on the enforcement and adjudication of commercial motor vehicle offenses. ($1,000,000)

General Operating Expenses ($92,194,000)

Staff Enhancements - To meet the challenges for improving the motor carrier program, the FMCSA is requesting an additional 69 full-time equivalent positions and operating funds for the motor carrier program. These positions directly support the identified target improvement areas and are vitally necessary to meet the Department's safety goal. In addition, direct program support staff is needed to administer legal support to the enforcement program and other activities necessary to achieve the agency mission. (approximately $10,000,000)

Research and Technology - The research and technology program supports FMCSA safety activities and initiatives. Some of the key projects that will begin or continue are: crash risk analysis; vehicle size, operational type and regulatory uniformity study; an evaluation of FMCSA compliance & enforcement information process; an evaluation and enhancement of CMV driver data exchange; the development of a SAFESTAT algorithm for motor coaches; technology deployment for improved hours-of-service compliance; shift changes research; shipper/receiver practices research; an observational study of car-truck interaction; and the development and deployment of a national highway watch program. More detailed information about each of the research and technology program activities is available in the FY2001 R&T Plan. ($9,550,000)

VII. PROGRAM EVALUATION

In FY 2001, FMCSA will continue a study presently underway of compliance review, roadside inspection, and traffic enforcement program effectiveness, and will initiate a study of the impact of penalties for non-compliance with Federal safety regulations. Initial program impact models were developed for the roadside inspection and compliance review programs in 1999. The premise of the *Safe-Miles* model is that the roadside inspection program has both direct and deterrent effects, each of which reduces crashes. The *CR Impact Assessment* model is based on the before and after changes, both individual and cumulative, in safety performance of carriers that received a

compliance review. Refinements to these two models will be reported in 2001. In addition, a new model is currently being designed to measure the impact of the MCSAP-funded traffic enforcement activity on fatalities, and another model will be designed to measure the overall effects of the FMCSA safety programs and their interactions. As prescribed in the Motor Carrier Safety Improvement Act of 1999, FMCSA will begin a study to assess how well the penalty structure defined in the Act deters noncompliance with the safety regulations.

VIII. OTHER FEDERAL PROGRAMS WITH COMMON OUTCOMES

FMCSA will continue a research program currently underway to examine the use of technological aids for fatigue management. This study is testing possible measures that reduce or ameliorate driver fatigue including sleep monitoring, alertness monitoring, and lane tracking. A pilot test initiated this year will be continued with over-the-road data collection in FY 2001. This project is being funded and managed by FMCSA, and involves the participation and cooperation of the Department of Defense and the commercial trucking industry.

FMCSA collaborates with other agencies in the Department of Transportation to develop and deliver research, regulatory, and outreach programs that contribute to the overall safety goals. As a new administration, FMCSA will seek to develop new program partnerships with other Federal agencies in the coming year. Potential partners include the National Institutes of Health and the Department of Labor.

IX. CONCLUSION

The Federal Motor Carrier Safety Administration's FY2001 budget request will enable the agency to contribute significantly to meeting the Departmental safety goal of reducing large truck-related fatalities and injuries. With additional staff resources and a renewed focus on program activities that enhance truck and bus safety, the FMCSA is committed to assuming a leading role in addressing the nation's highway safety problem particularly as it relates to commercial motor vehicle safety.

As discussed in this plan, approximately three-fourths of the total budget request of $279 million will be used for program activities that directly contribute to the achievement of the safety goal. With the cooperation of our partners in the implementation of the national program, this investment will yield a 10 percent reduction in the number of large truck-related fatalities based on forecasted trends between calendar years 1998 and 2001.

This plan represents a brief summary of the many program activities that the FMCSA will undertake to achieve its mission and outcome goals. For further information about specific programs and activities, please read the complete program request that is included in the budget submission or contact the FMCSA Acting Chief Safety Officer.

APPENDIX I. PERFORMANCE MEASURES (Detail)

Measure #1.	**Number of fatalities in crashes involving large trucks.**
Source:	NHTSA Fatality Analysis Reporting System (FARS), which is a census of fatal traffic crashes within the 50 states, D.C. and Puerto Rico. As such, it does not include information on crashes that produce only non-fatal injuries or that result in only property damage.
Scope :	To be included in FARS, a crash must result in the death of an occupant of a vehicle or a non-motorist within 30 days of the crash on a public roadway.
Method:	Data are collected in each state by state employees, translated into a standard format, and transmitted to the NHTSA. Data are collected from police crash reports, state vehicle registration files, driver licensing files, highway agency records, vital statistics, death certificates, coroner and medical examiner reports, hospital medical reports, and emergency medical service reports.
Verification & Validation	Data are reviewed and analyzed by NHTSA's National Center for Statistics and Analysis. Quality control procedures are an integral part of data collection and file creation. A study was completed in 1993, looking at samples of FARS cases in 1989-90 to assess the accuracy of data being reported.
Comment:	Fatal crash data has been available since 1975 and is generally accepted as a good source for describing safety on the Nation's highways.

Measure #2.	**Number of injured persons in crashes involving large trucks.**
Source:	NHTSA General Estimates System (GES).
Scope :	Injured persons data are derived from General Estimates System (GES), a nationally representative probability sample that makes national estimates of total nonfatal injury crashes, injured persons, and property-damage-only crashes. GES data cover all roadways open to the public.
Method:	GES data are obtained from a nationally representative sample of police crash reports in 60 sites. The results provide only national data, not state by state data.
Verification & Validation	Data are reviewed and analyzed by NHTSA's National Center for Statistics and Analysis. Quality control procedures are built into data collection and file creation.
Comment:	Injured persons data has been available since 1988 and provides a general picture of the Nation's motor vehicle crash experience. GES records injury severity in four classes: incapacitating injury, evident injury but not incapacitating, possible but not visible injury, and injury of unknown severity.

Measures #3. And #4.	**Large truck fatalities per 100 million vehicle-miles-traveled (VMT).** **Motor vehicle-related fatalities per 100 million vehicle-miles-traveled (VMT).**
Source:	NHTSA Fatality Analysis Reporting System (FARS), which is a census of fatal traffic crashes within the 50 states, D.C. and Puerto Rico. As such, it does not include information on crashes that produce only non-fatal injuries or that result in only property damage. Vehicle Miles of Travel (VMT) data is derived by FHWA from state reported estimates of travel based on various levels of sampling dependent on road type.
Scope:	To be included in FARS, a crash must result in the death of an occupant of a vehicle or a non-motorist within 30 days of the crash on a public roadway.
Method:	Data are collected in each state by state employees, translated into a standard format, and transmitted to the NHTSA. Data are collected from police crash reports, state vehicle registration files, driver licensing files, highway agency records, vital statistics, death certificates, coroner and medical examiner reports, hospital medical reports, and emergency medical service reports. VMT data are subject to estimation differences in the states, even though FHWA works to minimize such differences and differing projections on growth, population, and economic conditions which impact driving behavior.
Verification & Validation	Data are reviewed and analyzed by NHTSA's National Center for Statistics and Analysis. Quality control procedures are an integral part of data collection and file creation. A study was completed in 1993, looking at samples of FARS cases in 1989-90 to assess the accuracy of data being reported. VMT data is reviewed by FHWA for consistency and reasonableness.
Comment:	Fatal crash data has been available since 1975 and is generally accepted as a good source for describing safety on the Nation's highways. Adjusting raw highway fatalities by VMT provides a means of portraying the changes in highway fatalities on a constant exposure basis – to facilitate comparisons year-to-year.

Measure #5.	**Motor vehicle-related injured persons per 100 million vehicle-miles-traveled (VMT)**
Source:	NHTSA's General Estimates System (GES) for injury. Vehicle Miles of Travel (VMT) data is derived by FHWA from state reported estimates of travel based on various levels of sampling dependent on road type.
Scope:	Injured persons data are derived from General Estimates System (GES), a nationally representative probability sample that makes national estimates of total nonfatal injury crashes, injured persons, and property-damage-only crashes. GES data cover all roadways open to the public. Vehicle Miles of Travel (VMT) data are derived by FHWA from state reported estimates of travel based on various levels of sampling dependent on road type.
Method:	GES data are obtained from a nationally representative sample of police crash reports in 60 sites. The results provide only national data, not state by state data. VMT data are subject to estimation differences in the states, even though FHWA works to minimize such differences and differing projections on growth, population, and economic conditions which impact driving behavior.
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